THE BOTANICAL FINE ART WEEKLY.
Subscription Price\$30.00perAnnum. Single Copies\$1.00

Vol. 1., No. 6.

PUBLISHED WEEKLY BY G. H. BUEK & CO.

June 19th, 1894.

203 Broadway, New York.

ENTERED AT NEW YORK POST OFFICE, AS SECOND CLASS MATTER.

# "THE WILD FLOWERS OF AMERICA."\_\_\_\_

### The Greatest Success of the Times.

It's only a few days since the first of the Portfolios of "Wild Flowers of America" was ready for distribution and yet its reception seems already as if the whole nation was singing its praises. From College Presidents, Botanical Professors—teachers of all kinds, Senators, Congressmen, Lawyers, Doctors, Students and the great mass of thinking people, letters of the warmest commendation are pouring in, filling the mails, and constituting at once a demonstration rarely, if ever, approached in the history of popular publications in America. From the mass of letters we publish a few, selecting mostly those of college graduates and others whose actual experience makes them judges of the work they are writing about. We are just as grateful for the letters and telegrams and postal cards from the tens of thousands of young women and young men, whose admiration seems boundless; and may at another time show appreciation of them.

## A National Work Receives a National Testimonial.

- J. HAVENS RICHARDS, President Georgetown College, West Washington, D. C.:
- "The beauty and artistic excellence of the colored drawings are worthy of high praise, \* \* \* and I am confident that by its attraction many young people will be led to undertake and pursue with the greatest pleasure a study which they might otherwise find distasteful."
- J. V. COCKRILL, Congressman, Thirteenth District, Texas, Graduate of Chapel Hill College, Ex-District Judge:
  - "Is both beautiful and interesting."
- A. C. HARMER, Congressman, Philadelphia, representing Fifth District, Pennsylvania:
- "I have carefully examined Mr. Buck's works of the 'Wild Flowers of America,' and think them exquisite."
- DAN WAUGH, Congressman Ninth District, Indiana, Ex-Circuit Judge, member Seventh Agricultural Committee, House of Representatives:
  - "I regard it an excellent work of art, which would be an adornment to any library."

- CHAMP CLARK, Congressman Ninth District, Missouri, Graduate Bethany College, W. Va., Ex-President Marshall College, W. Va.
- GEO. W. SMITH, Congressman Twentieth District, Illinois, Graduate McKendree College, Lebanon, Ill.:
- $\lq\lq$  A valuable, beautiful and instructive book, and should be in every school-room in the land.  $\lq\lq$
- E. H. FUNSTON, Congressman, Second District, Kansas, Graduate Marietta College, Ohio, Ex-President State Senate:
- "In my judgment, will be a most valuable acquisition to the libraries of those who love the beautiful in nature."
- CHAS. H. MORGAN, Congressman, Fifteenth District, Missouri:
- "Deserves and will receive the encomiums from all lovers of the beautiful, and its correctness and completeness make it one of the most valuable contributions to American literature."





-- 82 -ELECAMPANE.
INULA HELENIUM.
AUGUST.

#### PLATE 81.

### FRINGED GENTIAN. GENTIANA AMERICANA (CRINITA). (GENTIAN FAMILY.)

Smooth annual; stem erect, much branched, winged above; leaves opposite, sessile, ovate, heart-shaped at base, acute; flowers large, solitary at the summit of the branches; calyx five-cleft, the divisions ovate-lanceolate with membranaceous margins; corolla deepty five-lobed, lobes obovate, fringed.

"Thou blossom bright with autumn dew,
And colored with the heavens' own blue,
That openest when the quiet light
Succeeds the keen and frosty night.

"Thou waitest late and com'st alone,
When woods are bare and birds are flown,
And frost and shortening days portend
The aged year is near his end.

"Then doth thy sweet and quiet eye
Look through its fringes to the sky,
Blue—blue—as if that sky let fall
A flower from its cerulean wall."—Bryant.



HE fringed gentian comes to us when all else is dying or dead. While the leaves of maple and sumach are red with the hectic flush that preludes decay, the low-land meadows and marshes give birth to this beautiful flower. The heavenly blue of its delicately fringed blossoms gleams from the browning marshes like the rain-bow through a storm—token that out of death life shall spring again. To those who look for the hidden meaning of things there is something of hope amidst the tender pathos of

"The blue-gentian-flower, that in the breeze,
Nods lonely, of her beauteous race the last."

The Fringed Gentian strays southward to Georgia, and is found westward almost to the Rockies.

#### PLATE 82.

### ELECAMPANE. INULA HELENIUM. (SUNFLOWER FAMILY.)

Stem erect from a large root; root-leaves, long-petioled, one foot or more long, oblong-ovate, dentate, woolly beneath, stem leaves clasping with a cordate base; heads large, terminating the branches; bracts of the involucre large, rhombic-ovate; rays numerous, very narrow.

"The noisome weeds that without profit suck the soil's fertility from wholesome flowers."—Shakespeare.



NE of the many Old World weeds that have found an abiding-place in North America, is the Elecampane. It is not as yet a common plant with us. In fields and roadsides it is met with now and then. Rather a striking plant it is, with large, velvety leaves and bright-yellow, narrow-rayed heads. The name Elecampane,—a pretty name, full of Old World suggestions,—is derived, as to the latter part, from *campus*, the Latin word for "a field." The prefix *cle* is said to be a modification of the Latin name for an allied plant, Helenium.

The thick root is filled with gum, and was formerly much used in medicine, combined with syrup, as a valuable tonic and stimulant. It is still used as an ingredient in confectionery in the rural parts of England. It is also used with anise and wormwood in flavoring cordials.

Inula Helenium is a native of Europe and of western Asia, as far southeastward as the Himalayas, -- "the heaven-kissing hills."



ARROWHEAD.

SAGITTARIA LATIFOLIA (VARIABILIS).

JULY.



— 84 — WILD ORANGE LILY. LILIUM PHILADELPHICUM.

#### PLATE 83.

### ARROW-HEAD. SAGITTARIA LATIFOLIA (VARIABILIS). (WATER-PLANTAIN FAMILY.)

Fibrous-rooted, acaulescent, semi-aquatic perennial; leaves on long, hollow petioles, net-veined, deeply sagittate or hastate the lobes often longer than the rest of the blade, obtuse or acute; flowers monocious, pedicelled or in whorls on a naked scape, the pistillate below, the staminate above.

"There was never mystery
But 'tis figured in the flowers."—Emerson.



MONG the wild-flowers one may find the emblem of every human passion, instinct, thought. Joy and sorrow, pleasure and pain, charity and hate, all have their sign in the plant-world. In the arrow-head we seem to have an emblem of war, of war after the fashion of the erstwhile-dwellers in our country. It is as if the weapons buried with the Indian sachem had sprung into life under the influence of some magic spell. Innocent arrow-heads are these that rise on their shafts out of the mud and the water. There is no venom on their points, they destroy no living thing, yet they mimic well the primitive instrument of death.

Sagittaria latifolia is a common plant in North America. The cluster of bright green leaves with the stalks of white flowers among them are to be seen in every shallow pool, in every bog and ditch. The well-opened flowers are quite pretty. Especially so are the staminate ones with the heart of golden stamens circled by the three milk-white petals.

We have several kinds of Sagittaria, of which Sagittaria latifolia is the most common. It is much like the European Arrow-Head.

#### PLATE 84.

### WILD ORANGE LILY. LILIUM PHILADELPHICUM. (LILY FAMILY.)

Perennial, stem erect from a scaly bulb, terete, smooth, branching towards the summit; leaves in whorls of five or six, sessile, lanceolate, acute, parallel-veined; flowers erect, terminating the branches; sepals six, long-clawed, blade ovate-lanceolate, orange spotted with purple; stamens six, with long filaments and versatile anthers.

EW handsomer flowers than the wild lilies are to be found in the meadows or woods of North America. The charm of these plants is never-failing. Perhaps no other flowers that lack fragrance are so much admired. They are elegant plants, the lilies. The simple, upright stems with their circles of smooth, green leaves so regularly disposed, and their crown of superb flowers,—what more of beauty could Nature bestow on them? We are not disappointed by their scentlessness. A perfumed Orange Lily would strike us as an incongruity,—much as if 'twere painted.

Thoreau associates the Orange Lily with the spirit of midsummer. He draws a fine picture of the landscape at that season and places this flower its central figure. "The red lily with its torrid color and sun-freckled spots, dispensing, too, with the outer garment of a calyx, its petals so open and wide apart that you can see through it in every direction, tells of hot weather. It is of a handsome bell-shape, so upright, and the flower prevails over every other part. It belongs not to spring."

Lilium Philadelphicum is by no means confined to the vicinity of Philadelphia. It is common in the northeastern States, extending westward beyond the Mississippi and southward to North Carolina and Tennessee.



— 85 —
WILD YELLOW LILY.
LILIUM CANADENSE.
JULY.



— 86 —
OX-EYE DAISY, WHITEWEED.
CHRYSANTHEMUM LEUCANTHEMUM.
JUNE.

#### PLATE 85.

### WILD YELLOW LILY. LILIUM CANADENSE. (LILY FAMILY.)

Stem simple, tall, rising from a bulb prolonged at base into a root-stock; leaves ovate-lanceolate, sessile, in whorls of four to six, minutely hispid on the margins and veins; flowers bell-shaped, nodding on the summits of the branches; sepals not clawed, orange-yellow with brown-purple spots.

"It was the time when lilies blow, And clouds are highest up in air."

HUS Tennyson begins one of his inimitable short poems. How delightfully suggestive are these simple lines! What charming visions of cool, gray-columned, green-canopied woods, of fresh, grassy, lilied meadows, the poet's words invoke!

While the Wild Orange Lily prefers dry soil, the Wild Yellow Lily thrives best in moist meadows and low woods. It is a more lusty plant than the other, taller and more abounding in sap. The bell-shaped flowers, on the other hand, are smaller and less brilliant than those of Lilium Philadelphicum, as is apt to be the case with strong-growing plants. They droop on their stalks,

while those of the other species are boldly erect. It is a more modest plant, though not less handsome, mayhap. The color of the petals is nearer a true yellow, the spots are more brown than purple.

The lily shares with the rose the honors of poetry and song. The injunction of the Master to "consider the lilies" has been well obeyed. Bards of every time and race have vied in singing the praises of these fairest flowers.

The Wild Yellow Lily grows over a wider territory than the Orange Lily, ranging farther both to North and South.

#### PLATE 86.

### OX-EYE DAISY, WHITEWEED. CHRYSANTHEMUM LEUCANTHEMUM. (SUNFLOWER FAMILY.)

Herbaceous perennial; stems branching, leafy, slightly pubescent; root-leaves long-petioled, ovate-oblong, deeply lobed and toothed; stem-leaves alternate, sessile, clasping, laciniate-toothed; heads large, on long, naked peduncles; involucre of many imbricated bracts; rays numerous, while; disk-flowers yellow; achieves without pappus.

VERYTHING depends upon the point of view. The flower that delights the eye of the painter and inspires the poet to Parnassian flights, is the detestation of the thrifty farmer. The Ox-Eye Daisy, so much admired by lovers of Nature, is the bane of every cultivated field wherein it gains a foot-hold. It is a hardy plant. When it can, it lives on the fat of the land, yet it will thrive in the poorest, least hospitable soil. Wordsworth, in a note to a poem on the Cave of Staffa, writes.—" Upon the head of the columns which form the front of the cave rests a body of decomposed basaltic matter, which was richly decorated with that large, bright flower, the ox-eyed daisy. I had noticed the same flower growing with profusion among the bold rocks on the western coast of

the Isle of Man, making a brilliant contrast with their black and gloomy surfaces."

The Ox-Eye Daisy, sturdy vagabond of field and roadside, is of the same genus as the aristocratic Chrysanthemums of gardens and conservatories. It is a handsome plant, 'tis true, but it owes much of its fame to being often taken for a humbler but more delicately-beautiful flower, the true English Daisy.



— 87 —
TURTLE-HEAD.
CHELONE GLABRAAUGUST.



LANCE-LEAVED LOOSESTRIFE.
STEIRONEMA LANCEOLATUM.

#### PLATE 87.

### TURTLE-HEAD. CHELONE GLABRA. (FIGWORT FAMILY.)

Whole plant smooth or nearly so; stem erect or ascending, much branched, angled; leaves opposite, short-petioled, ovate-lanceolate, acute, sharply-serrate, bright green above, paler beneath, veiny; flowers in dense, terminal, bracted spikes; corolla tubular-campanulate, two-lipped, woolly in the throat; perfect stamens four, with a vestige of a fifth.

"The million-handed sculptor molds
Quaintest bud and blossom folds,
The million-handed painter pours
Opal hues and purple dye."—Emerson.



HEN we dimly realize the innumerable forms and colors with which Nature diversifies the kindly mantle of vegetation that covers this ancient globe and hides its stern rock-masses, we must marvel at her unexhausted and inexhaustible fecundity. No two species, no two individuals, are fashioned just alike. Every blossom, every leaf, every twig has its special form and feature. Each petal has its peculiar hue, and no two colors are quite the same. The dyer who commands all the rain-bow tints that art has drawn from lifeless coal-tar, is resourceless as compared with "the million-handed painter."

In the autumn-season when the cicada shrills from yellowing willows and every scene and sound is suggestive of the passing of the year, we may make a new acquaintance at brooksides and in swamps. A fine plant, with dark green leaves and large, white, rose-tinged flowers in close spikes. This is the Turtle-head. The two-lipped corolla has an undeniable likeness to the head of a tortoise, with the mouth closed. It flowers in September and October.

#### PLATE 88.

### LANCE-LEAVED LOOSESTRIFE. STEIRONEMA LANCEOLATUM. (PRIMROSE FAMILY.)

Stem erect, branching above, slender, one or two feet high, four-angled, smooth; leaves opposite, sessile or on short, winged, ciliate petioles, smoothish, oblong-lanceolate, acute at apex, veiny; flowers on slender, axill ary pedicels; calyx deeply five-cleft; corolla rotate, five-parted, lobes toothed at apex.



FTEN growing with the common Fringed Loosestrife is a more elegant species, the Lance-leaved Loosestrife. This is a plant of marshes and of low, fertile woods. It ranges from Canada to the Gulf of Mexico, and to Texas and Dakota in the West.

The true Loosestrifes are species of Lysimachia, but the Steironemas are so closely allied that the name may not unfitly be applied to them. All have yellow, fringed corollas, dainty and pleasant to the eye. They belong to a family famous for the elegant beauty of its members. The Frimroses themselves, represented in this country by small, pink-flowered, rock-loving

plants of the North, are, in Europe, among the most beautiful and most cherished of spring wild-flowers. In England two species are especially famous,—the common yellow primrose, so dear to the people, and the fragrant cowslip. Then there are the glorious, many-colored Cyclamens, well-known to us in cultivation, natives of Southern Europe and the Levant. We have the odd and surpassingly beautiful Shooting-Star, sometimes called the American Cowslip, the curious Water-Feather with its swollen stems and the cunning little scarlet-eyed Pimpernel, naturalized from Europe.

#### PLATE 89.

### PRINCE'S PINE, PIPSISSEWA. CHIMAPHILA UMBELLATA. (HEATH FAMILY.)

Stem erect from a stender creeping root-stock, leafy, smooth; leaves scattered or in whorts of four or five, thick, shining above, obovate-lanceolate, sharply servate, acute at both ends; flowers few in a long peduncted corymb; petals five, pinkish; stamens ten, authers purple.



HE Chimaphila umbellata," writes Thoreau in his journal of "Summer," under date of July 3, 1852, "must have been in blossom some time. The back of its petals, 'cream-colored, tinged with purple,' which is turned towards the beholder, while the face is towards the earth, is the handsomer. It is a very pretty little chandelier of a flower, fit to adorn the forest floor. Its buds are nearly as handsome. They appear to be long in unfolding."

The species of Chimaphila, near relatives of the wintergreen, belong, in the fitness of things, to America. They harmonize well with the peculiar life of our great forests. They would be out of place in England or in Egypt. A beautiful little plant is the Prince's Pine, worthy of its aspiring name. The dark, shining leaves,—"I do not know any leaf so wet-glossy," says Thoreau,—surmounted by the little cluster of pink-purple flowers, make a singularly elegant combination.

The Prince's Pine, or let us call it by the Indian name, Pipsissewa, is found over the whole breadth of North America from the Atlantic to the Pacific, equally at home in the forests of the East and of California. *Chimaphila* means "winter-loving;" the leaves are evergreen.

#### PLATE 90.

### CALOPOGON. LIMODORUM (CALOPOGON) TUBEROSUS. (ORCHIS FAMILY.)

Glabrous perennial; stem sleuder, simple, erect from a small bulb, bearing one or two sheathing scales at base, and a single foliage leaf; leaf linear-lanceolate, parallel-veined, acute at both ends; flowers few in a bracted raceme at the summit of the scape, very urregular, pink and purple.



E have many beautiful orchids in North America, even outside the tropics. These northern orchids do not grow on the limbs of trees, but out of the ground as if they were ordinary plants. However, a look at the flowers is enough to satisfy us that ordinary plants these are not.

Perhaps the finest of our native Orchidaceæ is the Calopogon. It has no graceful foliage to enhance its charms. The single grass-like leaf, is easily overlooked. It is a plant of "flowers par excellence, all flowers, naked flowers." But the rare beauty of the blossoms makes anything else unnecessary. The rich, delightful rose-purple is accentuated by the vari-colored hairs with which the lip is "bearded." It is royally lovely. The sight of the Calopogon blowing in grassy meadows impresses the most indifferent

beholder, and is remembered ever after with a thrill of pleasure.

Limodorum tuberosus is a denizen of wet meadows and marshes throughout Eastern North America. It is a common plant in the East, but westward becomes quite scarce. In the South there are two or three kindred species, adorning the pine-barren swamps. The flowers are sometimes faintly fragrant.



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PRINCE'S PINE, PIPSISSEWA.
CHIMAPHILA UMBELLATA.
JUNE.



CALOPOGON,
LIMODORUM (CALOPOGON) TUBEROSUS.
JULY.

#### PLATE 91.

### WILD LILY-OF-THE-VALLEY. UNIFOLIUM (SMILACINA) BIFOLIUM. (LILY FAMILY.)

Stems simple, unbranched, erect from a creeping, scaly rootstock, glabrous, terete, zig-zag; leaves two or three, petioled, broadly ovate, or reniform, acute; flowers small, short-pedicelled, in a terminal, minutely bracted raceme; sepals four, reflexed, white; stamens four; fruit a reddish berry.

"The Naiad-like Lily of the Vale, .

Whom youth makes so fair and passion so pale,
That the light of its tremulous bells is seen
Through their pavilions of tender green."—Shelley.



HE Lily-of-the-Valley (Convallaria), so common in Europe, is very rare in America. It grows wild in the Blue Ridge and Alleghany Mountains. We have a little plant in our northern woods which is not unlike the true Lily-of-the-Valley, but which lacks its fine attribute of fragrance. It is the Unifolium.—Like so many of the Lily Family it has a delicate, almost fragile, beauty. There is almost always a certain exquisite refinement of form in the lilies.

The Lily-of-the-Valley signifies "the return of happiness." We may well transfer the significance to our plant, that opens its tiny white blossoms to the balmy breezes of May, sign that winter's icy reign is at an end.

The Unifolium bifolium is a native of Europe as well as of North America. It is found only in northern latitudes, or on high mountains. With us it is common in fertile, mossy woods northward and on wooded mountain summits in the South. It is one of our many wild-flowers which have not an English name. That of "Wild Lily-of-the-Valley" would be appropriate.

#### PLATE 92.

### PASQUE-FLOWER. PULSATILLA HIRSUTISSIMA. (CROWFOOT FAMILY.)

Perennial, whole plant hairy; stems clustered, rising from a short, woody rootstock, villous with long, silky hairs; root-leaves petioled, pinnately parted and cleft; stem leaves smaller, sessile; flower large, solidary at the summit of the stem; sepals usually six, purple; stamens numerous; carpels furnished with long, plumose tails.

"When trellised grapes their flowers unmask, And the new-born tendrils twine, The old wine darkling in the cask Feels the bloom on the living vine."—Emerson.



NE fancies, in the spring-time, that not only the tree-trunks with the streams of sap coursing through their trunks, not only the bursting buds and the up-springing flowers, but even the hard rocks, the soil, water, everything, is pulsating with life. Nature, in her protracted silence, has gathered strength for a new song.

While the hepaticas, spring-beauties and violets are putting forth their tender blossoms to adorn the eastern woods the western prairies are glowing with their own flowers. It is as if the sky had fallen upon them, they become sheets of blue. It is the blossoms of the pasque-flowers, newly opened, that at Easter-tide deck the landscape. Like daisies in English

meadows they spread over the broad expanse of plains.

The Pulsatilla has a large blossom. In color it is a delicate purplish-blue. It is much like the flowers of some cultivated species of Clematis. The flowers are succeeded by heads of seeds with long, silky, silvery-white tails, like those of the Virgin's Bower.



WILD LILY-OF-THE-VALLEY.

UNIFOLIUM (SMILACINA) BIFOLIUM.

MAY—JUNE.



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PASQUE FLOWER.

PULSATILLA HIRSUTISSIMA.

MAY—JUNE.

#### PLATE 93.

### COLUMNAR CONE-FLOWER. RUDBECKIA COLUMNARIS. (SUNFLOWER FAMILY.)

Root simple, stout; stems clustered, branched, angled and striate, rather minutely appressed-pubescent; leaves pinnate with linear or lanceolate, narrow leaflets, the lower petioled, the upper sessile; heads on long peduncles; receptacle cylindrical or columnar; rays not numerous, reflexed, yellow or purplish, much longer than the narrow involucral bracts.



HE most beautiful European wild-flowers make their homes in hedge-rows and waysides. So thickly settled are many parts of the Old World that the flowers must needs find room in the corners and bye-ways. Here, on the contrary, they have the range of great forests and boundless plains. Hence they are shyer than their transatlantic cousins. Instead of coming boldly out into villages and towns and exhibiting their charms to all the world, they seek homes in woodland solitudes and lonely vales.

America has preserved a fine forest-flora and a no less varied prairie vegetation. Among the characteristic plants of the plains, two great families are predominant. The Pea Family contributes the lupines, vetches, lead-plants, prairie-clovers. The Sunflower Family is represented by the golden rods, asters, blazing-stars, coreopsis, sun-flowers and cone-flowers.

Of these last, the Columnar Cone-flower is one of the prettiest and most showy. The long cylindrical disk and the drooping rays give an odd look to the heads. The rays are sometimes crimson-spotted or even entirely crimson, much like those of the Texan Coreopsis tinctoria. The Columnar Cone-flower grows from Minnesota south to Texas.

#### PLATE 94.

### AMERICAN SEA-ROCKET. CAKILE EDENTULA (AMERICANA). (CRESS FAMILY.)

Smooth, succulent annual; stems erect or ascending, bushy-branched; leaves alternate, obovate or spatulate, obtuse at apex, tapering into short petioles, margin undulate or obscurely dentate; flowers short-pedicelled in long, zig-zag racemes; petals four, pale pink; pods fleshy, two-jointed.



interesting class of plants are those that inhabit beaches and salt-marshes along the coast. They are rarely handsome plants. They are apt to have clumsy, fleshy stems, swollen joints and inconspicuous pinkish, white or green flowers. They are usually scraggly and misshapen, with a weather-beaten look. None the less, they are full of interest for the observing. They are excellent illustrations of the effect of environment on organisms. Their mode of growth is such that they offer the least possible resistance to assailing winds. Their fat and rugged stems, full of sap, possess almost inexhaustible vitality. They usually contain more or less salt, absorbed from the briny soil in which their roots are fixed. Wonderful is the power of some plants to select

certain minerals, present in minute quantity, from the soil, for use as building material. Just as the mollusc takes carbonate of lime from sea-water for its shell, or the coral-polyp for its stalk, so some plants absorb various salts which they put to use in their domestic architecture. Some, like horsetails and grasses, strengthen the exterior of their stems with silica. Certain maritime plants take in much iodine and bromine,—elements invaluable to the photographer. Cakile Edentula, a plant of the northern sea-coast absorbs more or less chloride of sodium, common salt.



COLUMNAR CONE-FLOWER.
RUDBECKIA COLUMNARIS.
JULY.



AMERICAN SEA ROCKET.
CAKILE EDENTULA (AMERICANA).
JULY.

#### PLATE 95.

### SERVICE-BERRY, SHAD-BUSH. AMELANCHIER BOTRYAPIUM. (ROSE FAMILY.)

Shrub or small tree not exceeding ten feet in height, with gray bark; leaves alternate on rather long petioles, oblong ovate, rounded or somewhat cordate at base, mucronate at apex, servate, bright green and smooth above, pale and pubescent beneath; flowers in short racemes, appearing before the leaves; petals five, oblong, white,

"When the sun-light fills the hours,
Dissolves the crust, displays the flowers"—



NE of the first American shrubs to leap into bloom is the Shad-bush. It is a novel sight, that of a Shad-bush covered with its gay white blossoms while the sluggard leaves are still sleeping snugly in their blankets. The Amelanchier just as its flowers begin to blow is the most showy object in the spring woods. Most of the early spring flowers are shy, low-growing herbs, nestling under banks or among the roots of trees. But the brave Shad-bush flaunts its white banners high among the other shrubs of the forest. Often it attains the dignity of arboreal height. When summer is at its prime, when the fine, bright green foliage of the Shad-bush is well-developed, it still has its glories, for then it is covered with bright red berries, beautiful berries, and of such a

delightful, piquant flavor! There is something "woody," suggestive of out-of-doors about the taste of the service-berries,—"sarvices," they call them in the Southern Mountains. There they are much esteemed for preserves. Whole families, armed with axes, go out on the hillsides for "sarvices." The trees are ruthlessly cut down to get the fruit.

#### PLATE 96.

### TRICOLORED GILIA. GILIA TRICOLOR. (PHLOX FAMILY.)

Annual, pubescent; stem evect, branching from near the base, terete; leaves alternate, the lower petioled, the upper nearly sessile, pinnatified, segments narrowly linear; flowers few in dense, cymose clusters at the ends of the branches; corolla rather large, funnel-shaped, tube narrow, limb five-cleft; stamens five, borne on the corolla.



ROUPS of plants peculiar to America, which are of the New World only, appeal to us, much as when we enter an Indian encampment and look upon the faces of Iroquois or Seminoles. So with Gilia. This great genus of beautiful plants is entirely confined to North and South America, mainly to the former continent. It is one of the Phlox Family, the other members of which are largely American, too. All the handsome Phloxes with their white, pink, crimson, purple or blue corollas are aboriginal. Most of the Gilias are natives of the southwestern States.

Gilia tricolor belongs to California, and is found over pretty much the whole of that state straying northward. It is a surpassingly beautiful little plant, perhaps the handsomest though not the showiest of the genus. The corolla is of three shades, which contrast with each other admirably. The tube is bright yellow; there is a band of rich, velvety purple in the throat and the border is of a clear lilac tint.

One of the most gorgeous of American plants is Gilia coronopifolia, the only species growing wild east of the Mississippi. It has narrow, tubular flowers of a vivid scarlet, and finely dissected leaves.



— 95 —
SERVICE BERRY, SHAD-BUSH.
AMELANCHIER BOTRYAPIUM.
MAY.



— 96 —
TRICOLORED GILIA.
GILIA TRICOLOR.

W H. Hatch, Congressman, First District, Missouri, Chairman Committee of Agriculture, House of Representatives, Washington, Representative for sixteen years, Bloomington, Ill.:

"Have no doubt that the book will be valuable as a text-book, and that it will go far toward the development of a love for the beautiful."

We fully concur in the above:

- B. F. Funk, Congressman, Fourteenth District, Illinois, Graduate Wesleyan University, Ex-Mayor Bloomington.
- JAS. W. MARSHALL, Congressman, Ninth District, Virginia, Graduate Roanoke College.
- JNO. DAVIS, Congressman, Fifth District, Kansas, Graduate Illinois College, one of the founders of the Agricultural College, Kansas.
- S. B. Alexander, Congressman, Sixth District, North Carolina, Graduate University of North Carolina, Member of the Agricultural Committee of the House of Representatives, Member State Board of Agriculture.
- H. M. Baker, Congressman, Second District, New Hampshire, Graduate of Dartmouth College, Ex-State Senator, Ex-Judge Advocate-General of New Hampshire.
- J. STERLING MORTON, Secretary of Agriculture of President Cleveland's Cabinet:

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We concur in the above:

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- W. A. Peffer, United States Senator, Member Agricultural Committee, Graduate Clarksville College, Tennessee, Judge Advocate of Military Commission during the war.
- W. N. Roach, United States Senator, Graduate Georgetown College, District of Columbia.
- W. D. WASHBURN, United States Senator, Graduate Bowdoin College, Surveyor-General Minnesota during Lincoln term, President Minneapolis & St. Louis Railroad, and Minneapolis & Sault St. Marie Railroad.

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